

**United States Court of Appeals  
for the Federal Circuit**

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**VIRNETX INC.,**  
*Appellant*

**v.**

**MANGROVE PARTNERS MASTER FUND, LTD.,  
APPLE INC.,**  
*Appellees*

**KATHERINE K. VIDAL, UNDER SECRETARY OF  
COMMERCE FOR INTELLECTUAL PROPERTY  
AND DIRECTOR OF THE UNITED STATES  
PATENT AND TRADEMARK OFFICE,**  
*Intervenor*

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2020-2271

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Appeal from the United States Patent and Trademark  
Office, Patent Trial and Appeal Board in Nos. IPR2015-  
01046, IPR2016-00062.

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**VIRNETX INC.,**  
*Appellant*

**v.**

**MANGROVE PARTNERS MASTER FUND, LTD.,  
APPLE INC., BLACK SWAMP IP, LLC,**

*Appellees*

**KATHERINE K. VIDAL, UNDER SECRETARY OF  
COMMERCE FOR INTELLECTUAL PROPERTY  
AND DIRECTOR OF THE UNITED STATES  
PATENT AND TRADEMARK OFFICE,**  
*Intervenor*

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2020-2272

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Appeal from the United States Patent and Trademark  
Office, Patent Trial and Appeal Board in Nos IPR2015-  
01047, IPR2016-00063, IPR2016-00167.

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**JUDGMENT**

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THIS CAUSE having been considered, it is

ORDERED AND ADJUDGED:

**AFFIRMED**

FOR THE COURT

March 30, 2023  
Date

/s/ Peter R. Marksteiner  
Peter R. Marksteiner  
Clerk of Court